Red Hat CloudForms 3.0 Management Engine 5.2 Release Notes

Summary of new features, corrections and known bugs for CloudForms Management Engine

Red Hat CloudForms Documentation Team

Red Hat CloudForms 3.0 Management Engine 5.2 Release Notes

Summary of new features, corrections and known bugs for CloudForms Management Engine

Red Hat CloudForms Documentation Team

Legal Notice

Copyright © 2015 Red Hat.

This document is licensed by Red Hat under the Creative Commons Attribution-ShareAlike 3.0 Unported License. If you distribute this document, or a modified version of it, you must provide attribution to Red Hat, Inc. and provide a link to the original. If the document is modified, all Red Hat trademarks must be removed.

Red Hat, as the licensor of this document, waives the right to enforce, and agrees not to assert, Section 4d of CC-BY-SA to the fullest extent permitted by applicable law.

Red Hat, Red Hat Enterprise Linux, the Shadowman logo, JBoss, MetaMatrix, Fedora, the Infinity Logo, and RHCE are trademarks of Red Hat, Inc., registered in the United States and other countries.

Linux ® is the registered trademark of Linus Torvalds in the United States and other countries.

Java ® is a registered trademark of Oracle and/or its affiliates.

XFS ® is a trademark of Silicon Graphics International Corp. or its subsidiaries in the United States and/or other countries.

MySQL ® is a registered trademark of MySQL AB in the United States, the European Union and other countries.

Node.js ® is an official trademark of Joyent. Red Hat Software Collections is not formally related to or endorsed by the official Joyent Node.js open source or commercial project.

The OpenStack ® Word Mark and OpenStack Logo are either registered trademarks/service marks or trademarks/service marks of the OpenStack Foundation, in the United States and other countries and are used with the OpenStack Foundation's permission. We are not affiliated with, endorsed or sponsored by the OpenStack Foundation, or the OpenStack community.

All other trademarks are the property of their respective owners.

Abstract

This document is the release notes for CloudForms Management Engine and contains a summary of all new features, major corrections from the previous version, and any known bugs upon general availability. Information and procedures in this book are relevant to CloudForms Management Engine administrators.

Table of Contents

Preface **2**
1. Document Conventions 2
1.1. Typographic Conventions 2
1.2. Pull-quote Conventions 3
1.3. Notes and Warnings 4
2. Getting Help and Giving Feedback 4

Chapter 1. About CloudForms Management Engine **6**

Chapter 2. Support Matrix **7**

Chapter 3. Enhancements **11**

Chapter 4. Major Corrections **14**

Chapter 5. Known Bugs **17**

Chapter 6. Registering and Updating CloudForms Management Engine **18**
6.1. Registering Appliances 18
6.2. Updating Appliances 19
6.3. Updating the Appliance Operating System 19

Chapter 7. Migrating to Red Hat CloudForms Management Engine 5.2 ..... **21**

Chapter 8. Enabling Public AMIs from Amazon EC2 ..... **22**

Revision History **23**

Preface

1. Document Conventions

This manual uses several conventions to highlight certain words and phrases and draw attention to specific pieces of information.

1.1. Typographic Conventions

Four typographic conventions are used to call attention to specific words and phrases. These conventions, and the circumstances they apply to, are as follows.

`Mono-spaced Bold`

Used to highlight system input, including shell commands, file names and paths. Also used to highlight keys and key combinations. For example:

> To see the contents of the file **`my_next_bestselling_novel`** in your current working directory, enter the **`cat my_next_bestselling_novel`** command at the shell prompt and press **`Enter`** to execute the command.

The above includes a file name, a shell command and a key, all presented in mono-spaced bold and all distinguishable thanks to context.

Key combinations can be distinguished from an individual key by the plus sign that connects each part of a key combination. For example:

> Press **`Enter`** to execute the command.
>
> Press **`Ctrl`**+**`Alt`**+**`F2`** to switch to a virtual terminal.

The first example highlights a particular key to press. The second example highlights a key combination: a set of three keys pressed simultaneously.

If source code is discussed, class names, methods, functions, variable names and returned values mentioned within a paragraph will be presented as above, in **`mono-spaced bold`**. For example:

> File-related classes include **`filesystem`** for file systems, **`file`** for files, and **`dir`** for directories. Each class has its own associated set of permissions.

Proportional Bold

This denotes words or phrases encountered on a system, including application names; dialog-box text; labeled buttons; check-box and radio-button labels; menu titles and submenu titles. For example:

> Choose **System** → **Preferences** → **Mouse** from the main menu bar to launch **Mouse Preferences**. In the **Buttons** tab, select the **`Left-handed mouse`** check box and click **`Close`** to switch the primary mouse button from the left to the right (making the mouse suitable for use in the left hand).
>
> To insert a special character into a **`gedit`** file, choose **Applications** → **Accessories** → **Character Map** from the main menu bar. Next, choose **Search** → **Find…** from the **Character Map** menu bar, type the name of the character in the **Search** field and click **`Next`**. The character you sought will be highlighted in the

> **Character Table**. Double-click this highlighted character to place it in the **Text to copy** field and then click the **Copy** button. Now switch back to your document and choose **Edit** → **Paste** from the **gedit** menu bar.

The above text includes application names; system-wide menu names and items; application-specific menu names; and buttons and text found within a GUI interface, all presented in proportional bold and all distinguishable by context.

Mono-spaced Bold Italic or ***Proportional Bold Italic***

Whether mono-spaced bold or proportional bold, the addition of italics indicates replaceable or variable text. Italics denotes text you do not input literally or displayed text that changes depending on circumstance. For example:

> To connect to a remote machine using ssh, type **ssh *username*@*domain.name*** at a shell prompt. If the remote machine is **example.com** and your username on that machine is john, type **ssh john@example.com**.
>
> The **mount -o remount *file-system*** command remounts the named file system. For example, to remount the **/home** file system, the command is **mount -o remount /home**.
>
> To see the version of a currently installed package, use the **rpm -q *package*** command. It will return a result as follows: ***package-version-release***.

Note the words in bold italics above: username, domain.name, file-system, package, version and release. Each word is a placeholder, either for text you enter when issuing a command or for text displayed by the system.

Aside from standard usage for presenting the title of a work, italics denotes the first use of a new and important term. For example:

> Publican is a *DocBook* publishing system.

1.2. Pull-quote Conventions

Terminal output and source code listings are set off visually from the surrounding text.

Output sent to a terminal is set in **mono-spaced roman** and presented thus:

```
books        Desktop   documentation  drafts  mss    photos   stuff  svn
books_tests  Desktop1  downloads      images  notes  scripts  svgs
```

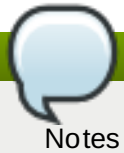
Source-code listings are also set in **mono-spaced roman** but add syntax highlighting as follows:

```
static int kvm_vm_ioctl_deassign_device(struct kvm *kvm,
                  struct kvm_assigned_pci_dev *assigned_dev)
{
         int r = 0;
         struct kvm_assigned_dev_kernel *match;

         mutex_lock(&kvm->lock);

         match = kvm_find_assigned_dev(&kvm->arch.assigned_dev_head,
                                       assigned_dev->assigned_dev_id);
         if (!match) {
                 printk(KERN_INFO "%s: device hasn't been assigned
```

```
before, "
                    "so cannot be deassigned\n", __func__);
                r = -EINVAL;
                goto out;
        }

        kvm_deassign_device(kvm, match);

        kvm_free_assigned_device(kvm, match);

out:
        mutex_unlock(&kvm->lock);
        return r;
}
```

1.3. Notes and Warnings

Finally, we use three visual styles to draw attention to information that might otherwise be overlooked.



Note

Notes are tips, shortcuts or alternative approaches to the task at hand. Ignoring a note should have no negative consequences, but you might miss out on a trick that makes your life easier.

Important

Important boxes detail things that are easily missed: configuration changes that only apply to the current session, or services that need restarting before an update will apply. Ignoring a box labeled “Important” will not cause data loss but may cause irritation and frustration.

Warning

Warnings should not be ignored. Ignoring warnings will most likely cause data loss.

2. Getting Help and Giving Feedback

If you experience difficulty with a procedure described in this documentation, visit the Red Hat Customer Portal at http://access.redhat.com. Through the customer portal, you can:

- search or browse through a knowledgebase of technical support articles about Red Hat products
- submit a support case to Red Hat Global Support Services (GSS)
- access other product documentation

Red Hat also hosts a large number of electronic mailing lists for discussion of Red Hat software and technology. You can find a list of publicly available mailing lists at https://www.redhat.com/mailman/listinfo. Click on the name of any mailing list to subscribe to that list or to access the list archives.

Documentation Feedback

If you find a typographical error in this manual, or if you have thought of a way to make this manual better, please submit a report to GSS through the customer portal.

When submitting a report, be sure to mention the manual's identifier: *Release Notes*

If you have a suggestion for improving the documentation, try to be as specific as possible when describing it. If you have found an error, please include the section number and some of the surrounding text so we can find it easily.

Chapter 1. About CloudForms Management Engine

Red Hat CloudForms Management Engine delivers the insight, control, and automation enterprises need to address the challenges of managing virtual environments, which are far more complex than physical ones. This technology enables enterprises with existing virtual infrastructures to improve visibility and control, and those just starting virtualization deployments to build and operate a well-managed virtual infrastructure.

Red Hat CloudForms 3.0 is comprised of a single component, the CloudForms Management Engine. It has the following feature sets:

- Insight: Discovery, Monitoring, Utilization, Performance, Reporting, Analytics, Chargeback, and Trending.
- Control: Security, Compliance, Alerting, Policy-Based Resource and Configuration Management.
- Automate: IT Process, Task and Event, Provisioning, Workload Management and Orchestration.
- Integrate: Systems Management, Tools and Processes, Event Consoles, CMDB, RBA, and Web Services.

Chapter 2. Support Matrix

Table 2.1. Browser Versions for CFME Console

Browser	Version
Microsoft Internet Explorer	8 and over
Mozilla Firefox	Firefox Extended Support Release FAQ
Google Chrome	Chrome for Business FAQ - Chrome for Business Help

Table 2.2. System SmartState Analysis Support by Guest Operating System

Guest Operating System	Support Status
Windows 2008	Y
Windows XP	Y
Windows 2000	Y
Windows Vista	Y
Windows Server 2003	Y
Windows 7	Y
Red Hat	Y
Fedora	Y
Debian and Debian Derived	Y
Ubuntu and Ubuntu Derived	Y
Suse and Open Suse Derived	Y

Table 2.3. SmartState Analysis Support by Guest File System

File System	Support Status
Ext3	Y
Ext4	Y
FAT32	Y
ISO9660 (CDFS)	Y
NTFS	Y
ReiserFS	Y

Table 2.4. SmartState Analysis Support by Provider

Provider	Support Status
VMware vCenter 4.0 (see Important note below)	Y
VMware vCenter 4.1 (see Important note below)	Y
VMware vCenter 5.0	Y
VMware vCenter 5.1	Y
VMware vCenter 5.5	Y
Red Hat RHEV-M 3.0	Y
Red Hat RHEV-M 3.1	Y
Red Hat RHEV-M 3.2	Y
Red Hat RHEV-M 3.3	Y
Microsoft Hyper-V Server 2008 R2 (see Important note below)	Y

Provider	Support Status
Microsoft Hyper-V Server 2012 (see Important note below)	Y

Important

CloudForms no longer supports version 4 of the vSphere VMware Remote Console (VMRC).

Microsoft is slated to be re-enabled, but it may not currently be available.

Table 2.5. Infrastructure Providers Where the CFME Appliance Can Reside

Provider	Support Status
VMware vCenter 4.0 and above	Y
Red Hat RHEV-M 3.1 and above	Y
Red Hat OpenStack 3.0	Y

Note

- See also Cloudforms Support for non-Red Hat Virtual and Cloud Infrastructures.
- See Red Hat Enterprise Virtualization Life Cycle for product life cycle information.
- From November 2014, the base operating system for the CloudForms Management Engine appliance will be Red Hat Enterprise Linux 6.5.

Table 2.6. Support by Feature

	Provider			Private Cloud	Public Cloud
Feature	VMware vCenter	Red Hat RHEVM	MS SCVMM HyperV	Red Hat OpenStack	Amazon EC2
Relationship discovery	Yes	Yes	Hyper-V / Vms	Yes	Yes
VM Drift Comparison	Yes	Yes	Yes	Some	Some
VM Analysis	Yes	Yes	Some	No	Some
Track VM Genealogy	Yes	Yes	Yes	Yes	Yes
Capacity & Utilization	Yes	Yes	No	Some	Some
Capture Infrastructure Event Timelines	Yes	Yes	No	N/A	N/A
Capture Cloud Layer Timelines	N/A	N/A	N/A	Yes	N/A

	Provider			Private Cloud	Public Cloud
Capture VM/Instance Event Timelines	Yes	Yes	No	Yes	N/A
Discovery - Provider	Yes	Yes	No	Yes	N/A
Host Drift Comparison	Yes	Yes	No	N/A	N/A
Optimization - Bottleneck Identification	Yes	Yes	No	N/A	N/A
Reporting	Yes	Yes	Yes	Yes	Some
Right Sizing	Yes	Yes	No	No	No
Chargeback	Yes	Yes	No	Fixed Allocation only	Yes
Insight Integrate Web Service	Yes	Yes	No	Yes	Yes
Host Compliance Enforcement	Yes	Yes	No	N/A	N/A
Host Policy Enforcement	Yes	Yes	No	N/A	N/A
Host Power Operations	Yes	No	No	N/A	N/A
Remote Console VM Access	Yes	No	No	No	No
Snapshot Creation and Removal	Yes	No	No	N/A	N/A
VM Cloning	Yes	No	No	N/A	N/A
VM / Instance Compliance Enforcement	Yes	Yes	No	Yes	Yes
VM / Instance Policy Enforcement	Yes	Yes	No	Yes	Yes
VM / Instance Power Operations	Yes	Yes	Yes	Yes	Yes
VM / Instance Retirement	Yes	Yes	Yes	Yes	Yes
Alerts – Real Time	Yes	No	No	Some	No
Alerts – VMware Alarms	Yes	N/A	N/A	N/A	N/A
Alerts – VM Value Changed	Yes	No	No	No	No

	Provider			Private Cloud	Public Cloud
Alerts – Reconfigured	Yes	No	No	No	No
Control Integrate Web Service	Yes	Yes	No	Yes	Yes
Provisioning Host	Yes	Some	No	N/A	N/A
Integrate with Service Catalogs	Yes	Yes	No	Yes	Yes
Provisioning VM / Instance using PXE	Yes	Yes	No	Yes	N/A
Provisioning VM / instance using ISO	No	Yes	No	N/A	N/A
Provisioning VM / Instance using Cloning	Yes	Yes	No	N/A	N/A
Virtual Machine Reconfiguration	Yes	No	No	Via Inline methods	No
VM Migration	Yes	No	No	Via Inline methods	No
Automation Work Flows	Yes	Yes	No	Yes	Some
Automate Integrate Web Service (Provision)	Yes	Yes	No	Yes	Yes
Remote Execution (Through Proxy if necessary)	Yes	Yes	Yes		Yes

Chapter 3. Enhancements

Cloud and Infrastructure Providers

The CloudForms Management Engine Console separates management systems into two menu tabs:

- The original **Infrastructure** tab, which contains all supported virtualization infrastructures.The **Infrastructure** tab retains all previous resources items (**Clusters**, **Hosts**, **Resource Pools**, **Datastores**, **Repositories**, and **PXE**) from the previous version of CloudForms Management Engine. Supported virtualization infrastructures include:
  - Red Hat Enterprise Virtualization
  - VMware ESXi.
- A new **Cloud** tab, which contains all supported public and private cloud providers. The **Cloud** tab also includes Insight features for cloud providers, such as **Availability Zones**, hardware profile **Flavors**, and **Instances** contained within cloud providers. Supported cloud providers include:
  - Amazon EC2 (public)
  - OpenStack (private)

Note

Management systems are now referred to as **Providers** under both menu tabs.

For more information, refer to the *CloudForms Management Engine Insight Guide*.

Appliance Support for OpenStack

Red Hat now provides a CloudForms Management Engine appliance for OpenStack environments. Download this appliance from the Red Hat Customer Portal and install it on your OpenStack environment.

For more information, refer to the *CloudForms Management Engine Installation Guide*.

OpenStack Integration

CloudForms Management Engine offers OpenStack as a Cloud Provider (previously Management System). This opens OpenStack environments to the CloudForms Management Engine feature set, including:

Insight:

- Inventory maintenance of OpenStack resources and instaces
- Relationship defintion across Openstack instances
- Timeline of OpenStack instance events
- Capacity & Utilization data
- Comparsion reports between instances

- Chargeback of CPU, network, and disk I/O utilization, as well as fixed cost
- Report generation
- Advanced search functions

Control:

- Power operations of instances
- Instance control policies and compliance checking
- Alerts for instance events

Automate:

- Self-service for instance provisioning
- Image-based provisioning
- Service-based provisioning
- Automation Engine integration
- Best-fit of instances based upon availability zone

Note

Features based on event collection, such as Timeline and Instance Comparison, are only supported for a QPID implementation of OpenStack, such as Red Hat OpenStack. Other OpenStack implementations, such as RabbitMQ, are not supported in this release.

Red Hat Customer Portal and Red Hat Satellite Integration

CloudForms Management Engine provides configuration options for the Red Hat Customer Portal or a local Red Hat Satellite.

View the new configuration options in the CloudForms Management Engine Console under **Settings and Operations → Settings accordion → [Region] → Red Hat Updates**.

For more information, see the *CloudForms Management Engine Settings and Operations Guide*.

Service Dialog Enhancements

Service dialogs in CloudForms Management Engine feature several new enhancements including:

- Default options
- Tag support
- Protected textboxes

Graphical and UI Enhancements

CloudForms Management Engine includes a new login screen, new UI design for menu items, and a new UI font set.

Addition of Amazon VPCs

Adds the collection of Amazon VPCs and their subnets into the CloudForms Management Engine database.

Virtual Machine View Enhancement

Adds 'IP Address' column to virtual machine views so users can see a virtual machine's IP address when logging in with a user_self_service role.

Addition of RHEV VM Memory Reservations

Enables a user to specify the amount of memory to reserve (memory guarantee in RHEV terms) for a given VM. Certain environments, such as non-production data centers have a requirement to overcommit VM memory utilization. By default, RHEV guarantees all requested memory for a VM, preventing the ability to overcommit memory. Administrators can now specify the amount of memory reserved for the VM.

Chapter 4. Major Corrections

BZ#1102777

VNC access to virtual machines is not available for some browser versions. Chrome versions prior to 33 and Firefox work as expected. Safari (version 7.0.4 (9537.76.4)) supports NPAPI plugins, but requires the specific plugin is enabled. To enable, open Preferences and click on Security. Click the checkbox next to 'Internet plug-ins' and click the 'Manage Website Settings'. Select the plugin and update the security setting to allow access on the URL. For more information, see https://access.redhat.com/articles/327203.

BZ#1111668

The automate task and the sub-task for add_disk used the same task_id value in the miq_queue table. This meant the queue items did not execute at the same time and did not complete as quickly as expected. This was fixed by passing a task_id of nil to the queue options for the add_disk task. The automate add_disk task now completes in a timely fashion.

BZ#1117993

Self service users are able to order catalog items only if they clicked "Order" versus clicking on the item and then clicking "Order". This was attributed to the issue where logged in user didn't have access to :sandt_tree.

Fixed code to pass in correct tree name to x_build_node_id method which has fixed the issue and self service users can now order a service without viewing catalog items.

BZ#1086386

Selecting a VM under the Infrastructure tab took anywhere from 10-18 seconds due to slow database queries. Improvements were made in the VM selection code in the appliance. It is now possible to select VMs under the infrastructure tab without a delay.

BZ#1124911

Users encountered an error while trying to launch the console interface after deploying an appliance based on Cloud Forms Management Engine 5.2. The error occured because a change to lib/Gemfile was backported but the corresponding change to the CFME rpm specification was not backported. This issue is fixed in the latest version of CFME.

BZ#1121284

Migrating roles to group settings during the upgrade from EVM V4 to the current Cloud Forms Management Engine codebase used to fail with the error - undefined method `settings' for nil:NilClass. This was because the migration code could not handle groups with a nil miq_user_role. This was fixed by making the migration code aware of such groups. The migration process now completes successfully with this fix.

BZ#1109349

If a user that was a member of multiple groups switched to another group, than reports and the folder/tree view did not work until the browser was refreshed. Code was changed to ensure that reports and the folder/tree view recognised the change and updated themselves. The report and views now work as expected.

BZ#1112808

Clicking on a service for a catalog item and setting ownership under configuration menu throws an error: undefined method id for nil:NilClass [service/x_button]

Unnecessary code was deleted where @record.id was being passed to locals while setting ownership on a service which has fixed the issue and no error is thrown.

BZ#1124875

Selecting the "Choose Automatically" option on the Environment tab during provisioning failed to find a suitable host for the request even though hosts were available. The eligible_resources method has been fixed to correctly update options during the creation workflow. Provisioning now automatically selects the least utilized host and storage.

BZ#1113186

In Infrastructure > Virtual Machines, clicking on timeline after selecting a tempate with timeline enabled threw an undefined method `first_and_last_event' for nil:NilClass [vm_infra/tl_chooser] because find for VmInfra record was breaking MiqTemplate record.

Added a new method controller_to_model that can be used to pass in model to identify_record call which has fixed the issue and no error is displayed when clicked on template timeline.

BZ#1115652

Attempting to create an instance in automate, threw an error: WARN -- : Session::DalliStore#set: Value too large, memcached can only store 1048576 bytes per key [key: MIQ:VMDB:86346c9e21029126785058ecd92202e6, size: 1126745].

Changed code to add/edit instance to not store AR Objects in @edit, but, to store the required fields into array of hashes instead. Besides, some minor cleanups were also made to methods. These changes has fixed the issue and now there is no error.

BZ#1120841

New Amazon EC2 instance types were causing an error in the appliance when refreshing an Amazon region with these new types deployed. The list of EC2 instance types has been updated and a region refresh works as expected.

Chapter 5. Known Bugs

BZ#1000187

Attempting to add a new user group to master region with more than 8000 VMs is failing due to a 502 Proxy Error.

BZ#1025567

Service dialog buttons are not showing up in correct footer area when ordering a service.

BZ#1025839

CloudForms Management Engine is unable to associate datastore vmdk files with virtual machines when not on the same datastore as the vmx file.

BZ#996284

A race condition causes the browser to redirect back to login page after successful authentication.

Chapter 6. Registering and Updating CloudForms Management Engine

The **Red Hat Updates** page enables you to edit customer information, register appliances, and update appliances. Editing customer information enables you to determine the registration point, User ID, and password. CloudForms prompts you to update the Server URL when updating the registration point to a local Red Hat Satellite. The **Status of Available Servers** area provides options to refresh, register, check for updates, and to update. The Red Hat Updates page enables the Content Delivery Network (CDN) to assign the necessary update packages to the CloudForms Management Engine Server.

Using the **Check For Updates** task button, the CDN assigns any necessary update packages to your server and notifies you. Click **Update** and the CloudForms Management Engine packages install and update.

Three steps are required for updating the CloudForms Management Engine Appliance:

1. Register the CloudForms Management Engine for updates if it is not already registered.
2. Update the CloudForms Management Engine Appliance.
3. Update other system packages.

The following tools are used during the update process:

- **Yum** provides package installation, updates, and dependency checking.
- **Red Hat Subscription Manager** manages subscriptions and entitlements.
- **Red Hat Satellite Server** runs at customer locations providing local system registration and updates from inside the customer's firewall.

Important

The update worker synchronizes the VMDB with the status of available CloudForms Management Engine content every 12 hours.

Note

Servers with the **RHN Mirror** role also act as a repository for other Appliances to pull CloudForms Management Engine packages updates.

6.1. Registering Appliances

The **Red Hat Updates** page enables you to register appliances.

Procedure 6.1. To Register a CloudForms Management Engine Appliance

1. Navigate to **Configure** → **Configuration**. Select **Region** in the accordion menu and click the **Red Hat Updates** tab.

2. Click **Edit Registration**. Three options are available for registering the CloudForms Management Engine Appliance:

Option	Use
Red Hat Subscription Management	Registers to the Red Hat hosted server (**subscription-manager** commands). Due to dependency issues, you must enable the CloudForms repo to use this option. To enable the repo, open a terminal to the appliance and run **yum-config-manager --enable cf-me-5.3-for-rhel-6-rpms**.
Red Hat Satellite 5	Registers to a Satellite 5 server that you have installed inside your firewall (**rhn** commands). This option is recommended for large, multi-appliance CloudForms Management Engine deployments.
Red Hat Satellite 6	Register to a Satellite 6 server (pending release) that you have installed inside your firewall (**subscription-manager** commands).

6.2. Updating Appliances

The **Red Hat Updates** page enables you to check for updates and update registered appliances.

Procedure 6.2. To Update a CloudForms Management Engine Appliance

1. Navigate to **Configure** → **Configuration**. Select **Region** in the accordion menu and click the **Red Hat Updates** tab.

2. After registering, the following options are available in the **Appliance Updates** section of the **Red Hat Updates** tab:

Option	Use
Check for Updates	Checks for available updates using **yum**.
Register	Attempts to register the appliance if it is not already registered. CloudForms Management Engine subscribes to the **rhel-x86_64-server-6-cf-me-3** RHN channel for RHN registered appliances, and to the products designated by Red Hat product certification for **subscription-manager** registered appliances. The Red Hat Enterprise Linux channels are enabled by default on registration. In addition, CloudForms Management Engine checks for updates after registering.
Apply CFME Update	Applies updates to CloudForms Management Engine packages only. Specifically, this option runs the **yum -y update cfme-appliance** command. This command installs every package listed in the dependency tree if it is not already installed. If a specific version of a package is required, that version of the package is installed or upgraded. No other packages, such as PostgreSQL or Red Hat Enterprise Linux, are updated.

6.3. Updating the Appliance Operating System

Users update CloudForms Management Engine packages through the web console under **Configure** → **Configuration** → **Settings** → **Region** → **Red Hat Updates**. However, updating the Appliance's operating system requires a manual update using the **yum** command.

Procedure 6.3. To Update an Appliance Operating System

1. Log in to the Appliance as the **root** user.
2. Run the **yum update** command and confirm any updates.

```
# yum update
...
Transaction Summary
============================================
Upgrade  52 Packages

Total download size: 34 M
Is this ok [y/N]: Y
```

Important

Scheduled downtime is required while updating system packages for the following reasons:

- Some updates may interrupt CloudForms Management Engine operations.
- Updates for the PostgreSQL database server suspend CloudForms Management Engine operations.
- System updates may require a reboot of the CloudForms Management Engine Appliance.

Chapter 7. Migrating to Red Hat CloudForms Management Engine 5.2

Specific steps are required to migrate from ManageIQ Enterprise Virtualization Manager (EVM) or CloudForms 2.1 to CloudForms 3.0 and CloudForms Management Engine (CFME) 5.2. The upgrade process requires deploying new CFME 5.2 Appliances, backing up the EVM Virtual Management Databases (VMDBs), restoring the EVM VMDBs to CFME 5.2 Appliances, and then migrating the EVM VMDBs to the CFME 5.2 level.

The steps required for migration vary depending on the environment from which you are migrating. Select the relevant instructions from the options below.

Migrating from ManageIQ EVM 4.x

See the Red Hat Knowledgebase article at https://access.redhat.com/site/articles/531953 for instructions on migrating from ManageIQ EVM 4.x to CloudForms 3.0 (CFME 5.2).

Migrating from ManageIQ EVM 5.x or CloudForms 2.0

See the Red Hat Knowledgebase article at https://access.redhat.com/site/articles/531963 for instructions on migrating from ManageIQ EVM 5.x or CloudForms 2.x to CloudForms 3.0 (CFME 5.2).

Chapter 8. Enabling Public AMIs from Amazon EC2

Users can alter the Main Configuration File to enable public AMIs from Amazon EC2 using the following procedure:

Procedure 8.1. To Enable Public AMIs

1. Open your Appliance.
2. Navigate to **Configure** → **Configuration** → **Advanced**.
3. Choose from the dropdown which **Configuration File** to edit. If not already automatically selected, choose **EVM Server Main Configuration**.
4. Search for the **get_public_images** parameter:

```
ems_refresh:
  capture_vm_created_on_date: false
  ec2:
    get_private_images: true
    get_shared_images: true
    get_public_images: false
    ignore_terminated_instances: true
```

5. To show public images, set the parameter to **get_public_images: true**. To remove public images from view again, set the parameter to **get_public_images: false**.

Result:

Public images are viewable in CloudForms Management Engine.

Note

For information on other parameters, see *Configuration Parameters* in the *Settings and Operations Guide*.

Revision History

Revision 1.6-0 **Wed Feb 4 2015** **CloudForms Docs Team**

Update product name to Red Hat CloudForms

Revision 1.5-0 **Tue Aug 12 2014** **Brian Moss**

Update for CloudForms 3.0.5 (CFME 5.2.5) release.
BZ#1111613 - Clarify language regarding event collection based features.

Revision 1.4-0 **Fri June 27 2014** **Suyog Sainkar**

Update for CloudForms 3.0.4 (CFME 5.2.4) release.

Revision 1.3-0 **Wed May 7 2014** **Suyog Sainkar**

Update for CloudForms 3.0.3 (CFME 5.2.3) release.
BZ#1076271 - Updated information on Registering and Updating CFME Appliance.
BZ#1079785 - Update Bugzilla information.

Revision 1.2-0 **Fri Feb 28 2014** **Brian Moss**

Update for CloudForms 3.0.2 (CFME 5.2.2) release.
BZ#1023103 - Add note that CloudForms no longer supports version 4 of the vSphere VMware Remote Console (VMRC).
BZ#1054013 - Update CFME 5.2 Support Matrix.

Revision 1.1-0 **Tue Jan 14 2014** **Brian Moss**

Update for CloudForms 3.0.1 (CFME 5.2.1) release.
Add Updating Red Hat CloudForms Management Engine section.
BZ#1029563 - Typo in "Table 2.5. Support by Feature".

Revision 1.0-0 **Tue Nov 5 2013** **Dan Macpherson**

Initial creation by publican.